Neutrino Frontier Colloquia

NF Conveners: Patrick Huber, Kate Scholberg, **Elizabeth Worcester**

Colloquia: **April 6,** April 20, April 27, May 4

https://snowmass21.org/neutrino/start

Intro to NF Colloquium Series

- NF colloquia are geared towards the entire Snowmass community
  - Welcome to colleagues from other frontiers
  - Please encourage your colleagues/students to attend
- Three colloquia per session, intended to span the broad scope of physics topics in the neutrino frontier, highlight connections to other frontiers, and offer pedagogical introductions, motivations, and experimental status/plans
  - April 7: Neutrinos in the three-flavor paradigm
  - April 20: BSM and anomalies in neutrinos
  - April 27: Neutrinos and nuclear physics
  - May 4: Neutrino connections to astrophysics, cosmology, and accelerator physics
- Talks will be recorded: https://indico.fnal.gov/category/1192/

Today's Colloquia: Neutrinos in the three-flavor paradigm

- Overview of the three-flavor paradigm (A. de Gouvêa, Northwestern): What is the current best picture of neutrino mass and mixings? What do we know and what do we still need to know?
- Current-generation experiments (R. Patterson, Caltech): Where will we be by the second half of this decade with the current suite of neutrino experiments?
- Future three-flavor experiments (C. Wilkinson, LBNL): What will be the reach of the next generation of three-flavor oscillation experiments? What are the future opportunities?